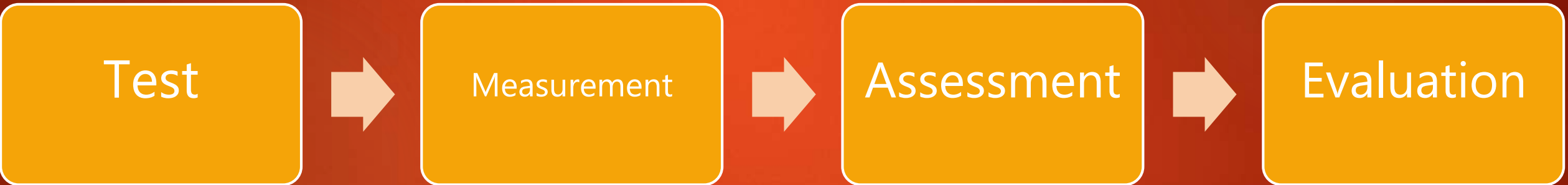




# Planning Assessment

THE BASIC TYPES OF ASSESSMENT

# Basic Concepts in Testing and Assessment



# What is a Test?

- ▶ Most commonly used method of making measurements in education
- ▶ An instrument or systematic procedures for measuring sample of behaviour by posing a set of questions in a uniform manner
- ▶ Designed to measure any quality, ability, skill or knowledge
- ▶ There is always right/best and wrong answer.

# What is Measurement?

- ▶ Basically assignment of numbers
- ▶ Variety of instruments such as tests, rating scales, rubrics are used
- ▶ The process of obtaining numerical description of the degree of individual processes
- ▶ Quantifying how much learners learned

# What is Evaluation?

It is the process of obtaining, analyzing and interpreting information to determine the extent to which students achieve the instructional objectives.

## STEPS OF EVALUATION

- Establishing the objectives
- Defining the objectives
- Selecting Indicators
- Comparing data with the objectives

# What is Assessment?

- ▶ Process by which evidence of student achievement is obtained and evaluated
- ▶ Information is used relative to objective
- ▶ Includes testing, interpreting and placing information in context
- ▶ Process of gathering and organizing data – the basis for decision-making (evaluation)
- ▶ Methods of measuring and evaluating the nature of the learner (what he learned/ how he learned)

# Assessment vs. Evaluation

Dimension of Difference	Assessment	Evaluation
<b>Content:</b> timing, primary purpose	<i>Formative:</i> ongoing, to improve learning	<i>Summative:</i> final, to gauge quality
<b>Orientation:</b> focus of measurement	<i>Process-oriented:</i> how learning is going	<i>Product-oriented:</i> what's been learned
<b>Findings:</b> uses thereof	<i>Diagnostic:</i> identify areas for improvement	<i>Judgmental:</i> arrive at an overall grade/score

# Assessment Principles

1. Address learning targets and curricular goals
2. Provide efficient feedback on instruction
3. Use a variety of assessment procedures
4. Ensure that assessments are valid, reliable, fair and usable
5. Keep record of assessment
6. Interpret the results of assessment meaningfully



# Assessment Requirements

- ▶ Providing relevant measures of learning outcomes and indirect evidence
- ▶ Determining what to be measured and defining it precisely
- ▶ Specifying the achievement domain so that the sample of items will represent the total domain.

# Planning an Achievement Test

1. Determining the purpose of assessment
2. Developing the test specifications
3. Selecting appropriate assessment tasks
4. Preparing relevant test items
5. Assembling the test
6. Administering the test
7. Appraising the test
8. Using the results

**GOAL: IMPROVED LEARNING AND INSTRUCTION**

(Gronlund & Linn, 1990)

# Instructional Objectives

## Essentials of Instructional Objectives

- Learning Activities (means to an end)
- Learning Objectives (end result)

## Components of Instructional Objectives

- Observable
- Nonobservable

# Cognitive Domain Levels

Level	Description	Verbs	Objective
Knowledge	To recall or recognize information in some pre-arranged form.	Define List	Define levels of cognitive domain.
Comprehension	To understand meaning of information based on prior learning.	Describe Explain Interpret	Explain purpose of cognitive domain.
Application	To utilize information to complete a task with limited direction.	Compute Solve Use	Write objective for levels of cognitive domain.
Analysis	To classify and relate assumptions or evidence.	Contrast Examine	Compare cognitive & affective domains.
Synthesis	To integrate or combine ideas into a new product or plan.	Design Develop Organize	Design way to write objectives that combines 3 domains.
Evaluation	Critique idea based on specific standards and criteria.	Appraise Judge Justify	Judge effectiveness of writing objectives using taxonomy.



Lesson	Lesson Name	Learning Objective
1	Welcome home!	Review present and past verb forms and <i>going to</i>
		Use <i>wh-</i> questions
		Use common questions for starting conversations
		Use common phrases for ending conversations
2	Transport trouble	Use common phrases to talk about work
		Ask and answer questions about transport
		Ask subject questions and object questions
		Understand and reply to a personal email
3	Pedro's survey	Talk about free time activities with <i>do, play, go and go to</i>
		Use frequency adverbs to say how often you do things ( <i>normally, occasionally, etc</i> )
		Use frequency expressions to say how often you do things ( <i>every Saturday, once a month, etc</i> )
4	When did you start your business?	Review the past simple of regular and irregular verbs
		Review past time phrases with <i>last, ago</i> and <i>in</i>
		Talk about past events
5	What were you doing when he phoned?	Learn and use past continuous (positive, negative and questions)
		Learn words and phrases for personal relationships
		Use past simple and past continuous to talk about past events
		Use echo questions to express surprise
6	That's amazing!	Learn adjectives to describe events ( <i>amazing, unfortunate</i> )
		Read and listen to stories about amazing coincidences
		Learn to use connecting words ( <i>while, what's more, however</i> )
		Use structures like "So did I" and "I didn't" to respond to statements
		Write an email to a friend giving news

## Instructional Objectives for B1 Level

# Test Types

## PRE-TESTING

1. Readiness Pre-test
2. Placement Pre-test

## DURING INSTRUCTION TESTING (Formative Assessment)

1. Formative Test
2. Diagnostic Test

## END OF INSTRUCTION TESTING (Summative Assessment)

1. Summative Test

# Pre-testing

They are given at the beginning of the instruction.

- ▶ To determine readiness
- ▶ To determine student placement
- ▶ To modify the instruction

❑ READINESS TESTS MAY BE LIMITED IN SCOPE.

# Testing During Instruction

- ▶ To provide the basis for formative assessment
- ▶ To monitor learning process
- ▶ To collect corrective prescriptions for learning objectives
- ▶ To diagnose learning difficulties of students
- ▶ To provide alternative methods for learning difficulties

Types of formative tests?

Tests, quizzes, end of unit tests.



# End of Instruction Testing

- ▶ To measure to what extent the intended learning outcomes and performance standards have been achieved
- ▶ To obtain data for summative assessment
- ▶ To provide feedback to students
- ▶ To encourage students
- ▶ To assess instruction and grading processes
- ▶ To assign remedial work
- ▶ To evaluate instructional effectiveness

## Summative versus Formative Assessment

	Formative	Summative
<b>Relation to Instruction</b>	<ul style="list-style-type: none"> <li>Occurs during instruction</li> </ul>	<ul style="list-style-type: none"> <li>Occurs after instruction</li> </ul>
<b>Frequency</b>	<ul style="list-style-type: none"> <li>Occurs on an ongoing basis (daily)</li> </ul>	<ul style="list-style-type: none"> <li>Occurs at a particular point in time to determine what students know</li> </ul>
<b>Relation to grading</b>	<ul style="list-style-type: none"> <li>Not graded – information is used as feedback to students and teachers, mastery is not expected when students are first introduced to a concept</li> </ul>	<ul style="list-style-type: none"> <li>Graded</li> </ul>
<b>Students role</b>	<ul style="list-style-type: none"> <li>Active engagement – self assessment</li> </ul>	<ul style="list-style-type: none"> <li>Passive engagement in design and monitoring</li> </ul>
<b>Requirements for use</b>	<ul style="list-style-type: none"> <li>Clearly defined learning targets that students understand</li> <li>Clearly defined criteria for success that students understand</li> <li>Use of descriptive versus evaluative feedback</li> </ul>	<ul style="list-style-type: none"> <li>Well designed assessment blueprint that outlines the learning targets</li> <li>Well designed test items using best practices</li> </ul>
<b>Examples</b>	<ul style="list-style-type: none"> <li>Better thought of as a process rather than a thing. Examples include observations, interviews, evidence from work samples, paper and pencil tasks</li> </ul>	<ul style="list-style-type: none"> <li>State assessments, interim assessments, end of unit assessments, common assessments</li> </ul>
<b>Purpose</b>	<ul style="list-style-type: none"> <li>Designed to provide information needed to adjust teaching and learning while they are still occurring</li> </ul>	<ul style="list-style-type: none"> <li>Designed to provide information about the amount of learning that has occurred at a particular point</li> <li>Since summative assessments occur <i>after</i> instruction every few weeks, months, or once a year, they help to evaluate the effectiveness of programs, school improvement goals, alignment of curriculum, or student placement in specific</li> </ul>

# Test Specifications

They provide official statement  
how it tests it.

- ▶ The test purpose
- ▶ Description of the test taker
- ▶ Test Level
- ▶ Construct
- ▶ Number of sections/papers
- ▶ Time of each section
- ▶ Text types/length

about what the test tests and

- ▶ Language elements to be tested
- ▶ Language skills to be tested
- ▶ Test tasks/methods
- ▶ Rubrics
- ▶ Criteria for marking
- ▶ Descriptions of typical performance expected

# Test Specifications

TASK: Find the specifications listed in the hand-outs.

# Developing Specifications

## Building a table of specifications

- Preparing a list of instructional objectives
- Outlining the course content
- Preparing the two-way chart

## Example: Reading

Subject: \_\_\_\_\_

Semester/Class: \_\_\_\_\_

School: \_\_\_\_\_

Test description: \_\_\_\_\_

Item	Cognitive	Techniques	Objectives	Item Types	Remarks
1.	C2	MC	Finding main idea	Topic sentence	
2.	C4	MC	Comparing Paragraphs	Difference	...
3.	C1	MC	Finding explicit info	Facts or Realities	...
4.	...	...	...	...	...

# How to Prepare a Table of Specifications

- ❑ List the general instructional objectives across the top of the table.
- ❑ List the major content areas down the left side of the table
- ❑ Determine what proportion of the test items should be devoted to each objective and each content area.



## Test blueprint for the 'Epreuve commune' in English

PAPER	TIME	MARKS	NUMBER OF TASKS	ITEMS PER SKILL	TASK	ITEMS PER TASK	TEST METHOD
Listening	30'	20	4	30	L1	6+2	6 items, 4-option MCQs with pictures and 2 items in a 6-option checklist
					L2	4	3-option MCQs or MM (4 answers + 2 distractors)
					L3	8	TFDS, sentence or table completion or form filling (prompt = monologue)
					L4	10	TFDS, sentence or table completion or form filling (prompt = dialogue)
Reading	30'	20	4	30	R1	7	MM (7 answers + 2 distractors) or information transfer
					R2	7	MM (signs and statements + 3 distractors) 3-option MCQs or 4-option MCQs
					R3	8	3-option MCQs, TFDS, short answers, banked gap-fill
					R4	8	3-option MCQs, TFDS, short answers, banked gap-fill
Writing	40'	20	2	n/a	W1	n/a	Guided writing (interactive writing), 70-80 words
					W2	n/a	Free writing (writing a narrative), 120-140 words
Total	100'	60	10				

MCQs – multiple choice questions / response

MM – multiple matching

TFDS – true, false, does not say



# Using one way classification system

- ▶ For a reading test, a list of reading skills and the number of test items for measuring each skill may be sufficient.
- ▶ The content may vary, but the skill outcomes remain fairly constant.
- ▶ A master list of skills can be prepared with various types of reading material. (Criterion-referenced interpretation)
- ▶ The material is not included in the specifications, it will need to be carefully selected.

# General Classification of Test Items

## Selection-typed Items

- Multiple Choice, True/False

## Supply-typed Items

- Essay, Short Answer

# Selecting Appropriate Types of Items and Assessment Tasks

## Classroom Test: Objective test items

- Highly structured
- Require to supply a word or two/select the correct answer
- A single right or best answer

## Performance Assessments: Constructive responses

- Permit to organize and construct the answer in the essay form
- Require generating hypotheses, make observations, construct something, or perform for an audiences
- No single right response; a variety of responses

# The Objective Test Item

## ► SUPPLY TYPES

- Short answer

What is another name for blueprint of a test?  
(Test Specifications)

What are the essentials of a test?  
(Validity, reliability, practicality, and fairness)

# The Objective Test Item

## ► SUPPLY TYPES

### Completion

- ❑ A set of standardized questions, problems, or tasks designed to elicit responses for use in measuring the traits, capacities, or achievements of an individual is \_\_\_\_\_.
- ❑ (Testing)
- ❑ \_\_\_\_\_ is the assignment of a number to a characteristics of an object or event, which can be compared with other objects or events.

(Measurement)

# The Objective Test Item

## ► SELECTION TYPES

- Matching

- |            |                |
|------------|----------------|
| 1. And     | A. Adjective   |
| 2. Dog     | B. Adverb      |
| 3. Jump    | C. Conjunction |
| 4. She     | D. Noun        |
| 5. Quickly | E. Preposition |
|            | F. Pronoun     |

# The Objective Test Item

## ► SELECTION TYPES

True-false or Alternative Response

T	F	A virus is the smallest known organism.
T	F	An atom is the smallest particle of matter.
YES	No	Tigers are from the cat family.
YES	No	Acid turns litmus paper red.

# The Objective Test Item

## ► SELECTION TYPES

### - Multiple Choice

A synonym for expensive

- A. cheap
- B. costly
- C. inexpensive
- D. easy

In which are the following sentences do the subject and verb disagree?

- A. When they win, they are happy.
- B. Politics are hard to understand.
- C. The majority is always right.
- D. One or the other is to be elected.



# Pros and Cons of Objective Tests

- ▶ Highly structured tasks that limits the type of response
- ▶ Demonstration of the specific knowledge, understanding, or skill called for in the item.
- ▶ No redefinition of the problem or organization and presentation of the answer.
- ▶ Objective scoring
- ▶ Quick, easy and accurate.
- ▶ On the negative side, inappropriate for measuring the ability to measure higher level cognitive outcomes.

# Performance Assessment Tests

- ▶ Measure higher level cognitive outcomes.
- ▶ Measure ability to engage in hands-in activities
- ▶ Permit to decide which facts are most pertinent, to select own method of organization, and to write as much as seems necessary.
- ▶ Ability to reveal the ideas, relate them correctly and express them comprehensively.

# Performance Assessment Tests

## ► EXTENDED RESPONSE ESSAY QUESTION

- Describe what you think the role of the government should be in maintaining a more qualified educational system in Turkey. Include specific policies and programs and give reasons for your proposals. **(300 words)**

**You have 30 mins to plan and organize your respond.**

# Performance Assessment Tests

## ► RESTRICTED RESPONSE ESSAY QUESTIONS

- State two advantages and two disadvantages of living in a village
- Write about your last holiday. Include the following.
  - Where was it?
  - When was it?
  - Who were you with?
  - Why was it special for you?

# Weaknesses of performance assessment tasks

- ▶ Inefficient for measuring knowledge of factual material
- ▶ Unreliable and difficult scoring
- ▶ Scoring criteria are not apparent to the students.
- ▶ On the positive side, more complex cognitive objectives are measured.

# Other Types of Performance Assessment

## ▶ EXTENDED-RESPONSE PERFORMANCE TASKS

- Prepare a video for another country and make an oral presentation to the class using appropriate visual displays.

# Other Types of Performance Assessment

## ▶ RESTRICTED-RESPONSE PERFORMANCE TASKS

- Talk about your graduation prompt.

# Comparative Advantages of Objective Test Items and Performance Assessment Tasks

## Objective Test

- ▶ Knowledge of facts and lower thinking skills
- ▶ Large number of questions
- ▶ Preparation is difficult and time consuming.
- ▶ Provides extensive sampling of course content.
- ▶ Objective scoring.

## Performance Assessment

- ▶ Higher level thinking skills and complex learning outcomes
- ▶ Few tasks are needed
- ▶ Preparation is relatively easier compared to objective tests.
- ▶ Sampling of course content is usually limited.
- ▶ Judgmental scoring.



## Comparative Advantages of Objective Test Items and Performance Assessment Tasks

### Objective Test

- ▶ Prevents bluffing and avoids influence of writing skills.
- ▶ Selection type items are subject to guessing.
- ▶ Encourages comprehension.
- ▶ High reliability is possible and is typically obtained with well-constructed tests.

### Performance Assessment

- ▶ Enables to display originality, freedom to respond personally.
- ▶ Guessing is minimized.
- ▶ Encourages focus on larger units of subject matter.
- ▶ Reliability is typically low due to limited number of tasks and inconsistent scoring.

# Selecting the most appropriate types of items and tasks

SELECT THE ITEM TYPE THAT PROVIDES THE MOST DIRECT MEASURE OF THE INTENDED LEARNING OUTCOME.

- ▶ The outcome is writing, naming, or listing → a supply type item
- ▶ The outcome is solving a problem → a performance task
- ▶ the task is to identify a correct answer → a selection-type item

# Eliminating Irrelevant Barriers in Test Items

- ▶ Avoiding ambiguity in statements in item roots.
- ▶ Eliminating unnecessary wording
- ▶ Making use of communicating vocabulary
- ▶ Providing clear cut and familiar instructions
- ▶ Eliminating any kind of bias in alternatives

Task: Eliminate the unnecessary wording above.

# Eliminating Irrelevant Barriers in Test Items

- ▶ Ambiguous Statements
- ▶ Excessive Wordiness
- ▶ Difficult Vocabulary
- ▶ Complex Sentence Structure
- ▶ Unclear Instructions
- ▶ Unclear Test Items/Tasks
- ▶ Racial, Ethnic, or Gender Bias

## General Suggestions for Writing Test Items and Assessment Tasks

- ▶ Use your test specifications as a guide.
- ▶ Write more items than needed.
- ▶ Write the items in advance of the testing date.
- ▶ Write each test item so that they are to be performed clearly.
- ▶ Write each item at an appropriate reading level.
- ▶ Write each item so that it does not provide help in responding other items.